

SEQUENCE LISTING

(1) GENERAL INFORMATION:

- (i) APPLICANT: Rybak, Susanna M.
Newton, Dianne L.
Goldenberg, David M.
- (ii) TITLE OF INVENTION: Immunotoxins Directed Against Malignant Cells
- (iii) NUMBER OF SEQUENCES: 3
- (iv) CORRESPONDENCE ADDRESS:
(A) ADDRESSEE: Townsend and Townsend and Crew LLP
(B) STREET: Two Embarcadero Center, Eighth Floor
(C) CITY: San Francisco
(D) STATE: California
(E) COUNTRY: USA
(F) ZIP: 94111-3834
- (v) COMPUTER READABLE FORM:
(A) MEDIUM TYPE: Floppy disk
(B) COMPUTER: IBM PC compatible
(C) OPERATING SYSTEM: PC-DOS/MS-DOS
(D) SOFTWARE: PatentIn Release #1.0, Version #1.30
- (vi) CURRENT APPLICATION DATA:
(A) APPLICATION NUMBER: US 09/071,672
(B) FILING DATE: 01-MAY-1998
(C) CLASSIFICATION:
- (vii) PRIOR APPLICATION DATA:
(A) APPLICATION NUMBER: US 60/046,895
(B) FILING DATE: 02-MAY-1997
- (viii) ATTORNEY/AGENT INFORMATION:
(A) NAME: Weber, Ellen Lauver
(B) REGISTRATION NUMBER: 32,762
(C) REFERENCE/DOCKET NUMBER: 015280-32510US
- (ix) TELECOMMUNICATION INFORMATION:
(A) TELEPHONE: (415) 576-0200
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(2) INFORMATION FOR SEQ ID NO:1:

- (i) SEQUENCE CHARACTERISTICS:
(A) LENGTH: 104 amino acids
(B) TYPE: amino acid
(C) STRANDEDNESS:
(D) TOPOLOGY: linear
- (ii) MOLECULE TYPE: protein

09918887 073004

(ix) FEATURE:

- (A) NAME/KEY: Modified-site
- (B) LOCATION: 1
- (D) OTHER INFORMATION: /product= "OTHER"
/note= "Xaa = Glu or pyroglutamic acid"

(ix) FEATURE:

- (A) NAME/KEY: Protein
- (B) LOCATION: 1..104
- (D) OTHER INFORMATION: /note= "RNase A derived from
Rana pipiens, "onc protein""

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:1:

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Xaa Asp Trp Leu Thr Phe Gln Lys Lys His Ile Thr Asn Thr Arg Asp
1          5          10          15
Val Asp Cys Asp Asn Ile Met Ser Thr Asn Leu Phe His Cys Lys Asp
          20          25          30
Lys Asn Thr Phe Ile Tyr Ser Arg Pro Glu Pro Val Lys Ala Ile Cys
          35          40          45
Lys Gly Ile Ile Ala Ser Lys Asn Val Leu Thr Thr Ser Glu Phe Tyr
50          55          60
Leu Ser Asp Cys Asn Val Thr Ser Arg Pro Cys Lys Tyr Lys Leu Lys
65          70          75          80
Lys Ser Thr Asn Lys Phe Cys Val Thr Cys Glu Asn Gln Ala Pro Val
          85          90          95
His Phe Val Gly Val Gly Ser Cys
          100

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(2) INFORMATION FOR SEQ ID NO:2:

(i) SEQUENCE CHARACTERISTICS:

- (A) LENGTH: 249 base pairs
- (B) TYPE: nucleic acid
- (C) STRANDEDNESS: single
- (D) TOPOLOGY: linear

(ii) MOLECULE TYPE: DNA

(ix) FEATURE:

- (A) NAME/KEY: -
- (B) LOCATION: 1..249
- (D) OTHER INFORMATION: /note= "nucleic acid encoding
"onc protein""

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:2:

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GATGTTGATT GTGATAATAT CATGTCAACA AACTTGTTCC ACTGCAAGGA CAAGAACACT      60
TTTATCTATT CACGTCCTGA GCCAGTGAAG GCCATCTGTA AAGGAATTAT AGCCTCCAAA      120

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AATGTGTAA CTACCTCTGA GTTTATCTC TCTGATTGCA ATGTAACAAG CAGGCCTTGC. 180
 AAGTATAAAT TAAAGAAATC AACTAATAAA TTTTGTGTAA CTTGTGAAAA TCAGGCACCA 240
 GTTCATTTT 249

(2) INFORMATION FOR SEQ ID NO:3:

(i) SEQUENCE CHARACTERISTICS:

- (A) LENGTH: 83 amino acids
- (B) TYPE: amino acid
- (C) STRANDEDNESS:
- (D) TOPOLOGY: linear

(ii) MOLECULE TYPE: protein

(ix) FEATURE:

- (A) NAME/KEY: Protein
- (B) LOCATION: 1..83
- (D) OTHER INFORMATION: /note= "\"onc protein\", positions 16-98
of SEQ ID NO:1"

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:3:

Asp	Val	Asp	Cys	Asp	Asn	Ile	Met	Ser	Thr	Asn	Leu	Phe	His	Cys	Lys	1	5	10	15
Asp	Lys	Asn	Thr	Phe	Ile	Tyr	Ser	Arg	Pro	Glu	Pro	Val	Lys	Ala	Ile	20	25	30	
Cys	Lys	Gly	Ile	Ile	Ala	Ser	Lys	Asn	Val	Leu	Thr	Thr	Ser	Glu	Phe	35	40	45	
Tyr	Leu	Ser	Asp	Cys	Asn	Val	Thr	Ser	Arg	Pro	Cys	Lys	Tyr	Lys	Leu	50	55	60	
Lys	Lys	Ser	Thr	Asn	Lys	Phe	Cys	Val	Thr	Cys	Glu	Asn	Gln	Ala	Pro	65	70	75	80
Val	His	Phe																	

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